



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/960,649	09/21/2001	Vivian Pecos	4940/1M	5265
33690	7590	10/25/2005		
DAVID LOEWENSTEIN 802 KING ST. RYE BROOK, NY 10573			EXAMINER CHANKONG, DOHM	
			ART UNIT 2152	PAPER NUMBER
DATE MAILED: 10/25/2005				

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No. .

09/960,649

Applicant(s)

PECUS ET AL.

Examiner

Dohm Chankong

Art Unit

2152

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 04 August 2005.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-12 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-12 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____.
- ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____.
- ☐ Notice of Informal Patent Application (PTO-152)
- ☐ Other: _____.

DETAILED ACTION

- 1> This action is in response to Applicant's remarks. Claims 1-12 are presented for further examination.
- 2> This is a non-final rejection.

Response to Arguments

- 3> Applicant's arguments with respect to claims 1-12 have been considered but are moot in view of the new ground(s) of rejection.

Double Patenting

- 4> Claims 1-3 are provisionally rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-3 of copending Application No. 09/960605. Although the conflicting claims are not identical, they are not patentably distinct from each other because the other claim is equivalent in scope and embodiment. Claims 1-3 of the instant application are equivalent to the claims 1-3 of copending application 09/960605 with respect to a edge node that receives content from a NOC via a satellite link and distributes it to a last mile service provider. All of the structural elements of the co-pending claims are present in the pending claims, defined with either identical or equivalent language. Additionally, the functional language, although varying in syntax, reflects identical operation, purpose, application and environment.

The differences between the claims are the use of a load balancer and a single rack

Art Unit: 2152

housing for the hardware. The addition of a load balancer is well known in the art in terms of its basic building blocks and are ubiquitous and expected in the art. The claims in the co-pending application reference installing the media server, private VLAN and public VLAN in a single rack while the claims of the instant application reference these elements in a single computer. A "single rack" and a "single computer" serve identical purposes and are merely an obvious variation of another. Furthermore, there is no apparent reason why application would be prevented from presenting claims corresponding to those of the instant application in the other co-pending application. It has been held that omission of an element and its function is an obvious expedient if the remaining elements perform the same function as before. In re Karlson, 126 USPQ 184 (CCPA). Also note Ex parte Rainu, 168 USPQ 375 (Bd. App. 1969); omission of a reference element whose function is not needed would be obvious to one skilled in the art.

This is a provisional obviousness-type double patenting rejection because the conflicting claims have not in fact been patented.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5> Claims 1-12 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Art Unit: 2152

- a. Claims 1 and 4 are rejected for lacking proper antecedent basis : “the satellite link”.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

- 6> Claims 4, 6, 8, 10 and 12 are rejected under 35 U.S.C § 102(e) as being anticipated by Headings et al, U.S Patent Publication No. 2002|0083006 [“Headings”].

- 7> As to claim 4, Headings discloses an edge node that receives content from a Network Operations Center (NOC) via a satellite content distribution network and distributes it to a last mile service provider, the edge node comprising:

a processor that executes for serving both live and non-live content [Figure 2 | 0002];

a satellite interface, connected to the processor, that receives content from the satellite link [Figure 14 | 0038];

a wire network interface, connected to the processor, for transmitting content to the last mile service provider [Figure 2 | Figure 14 : “broadband network”].

Art Unit: 2152

where the processor, satellite interface, and wire network interface exist in a single personal computer [Figure 2 | Figure 14 | 0038].

8> As to claim 6, Headings discloses a terrestrial link provides a back channel to the NOC [Figure 2 : note link between the media server farm to the content management system].

9> As to claim 8, Headings discloses content that is streamed [0002, 0032].

10> As to claim 10, Headings discloses one or more additional media servers capable of serving both live and non-live content [Figure 2 | 0002].

11> As to claim 12, Headings discloses shared storage connected to the satellite interface and the processor [Figure 14 : "content storage"].

12> Claims 4, 6, 8, 10 and 12 are rejected under 35 U.S.C § 102(e) as being anticipated by Lahr, U.S Patent Publication No. 2001|0029525 ["Lahr"].

13> As to claim 4, Lahr discloses an edge node that receives content from a Network Operations Center (NOC) via a satellite content distribution network and distributes it to a last mile service provider, the edge node comprising:

a processor that executes for serving both live and non-live content [Figure 8 | 0027];

a satellite interface, connected to the processor, that receives content from the satellite link [Figure 2 | Figure 4 | 0020, 0023];

a wire network interface, connected to the processor, for transmitting content to the last mile service provider [Figure 2 | 0020, 0023].

where the processor, satellite interface, and wire network interface exist in a single personal computer [Figure 3 | 0020, 0023 : the edge device connected to both the satellite interface and wire network such as the Internet].

14> As to claim 6, Lahr discloses a terrestrial link provides a back channel to the NOC [0044].

15> As to claim 8, Lahr discloses content that is streamed [Figure 8 | 0041].

16> As to claim 10, Lahr discloses one or more additional media servers capable of serving both live and non-live content [Figure 8 | 0032, 0041].

17> As to claim 12, Lahr discloses shared storage connected to the satellite interface and the processor [Figure 3 | Figure 8 | 0020, 0023].

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

Art Unit: 2152

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

18> This application currently names joint inventors. In considering patentability of the claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various claims was commonly owned at the time any inventions covered therein were made absent any evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out the inventor and invention dates of each claim that was not commonly owned at the time a later invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c) and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

19> Claims 1-3, 5, 7, 9 and 11 are rejected under 35 U.S.C § 103(a) as being unpatentable over Headings.

20> Headings is directed towards a system for delivering media content. The content can be centrally stored and distributed through various means to an endpoint server through which an ISP is able to receive the content [see for example, Figure 2 | 0031, 0032].

21> As to claim 1, Headings discloses an edge node that receives content from a Network Operations Center (NOC) via a satellite content distribution network and distributes it to a last mile service provider, the edge node comprising:

one media server capable of serving both live and non-live content [0002, 0032 :

Art Unit: 2152

media content includes both live and non-live content];

a private Virtual Local Area Network (VLAN) that receives content from the satellite link and distributes it to the media server [Figure 14 | 0031, 0032, 0049];

a public VLAN that transmits the received content from the server to a last mile service provider [Figure 14 | 0053 : “Internal VLAN 1” connected to the subscribers F₁, F₂ and F₃]; and

where the media server is connected to both the public and private VLANs [Figure 14].

Headings does not explicitly disclose that the media server, private VLAN, and public VLAN exist in a single computer. However, Headings seems to suggest such functionality. He describes the VLANs as “internal” VLANs, his endpoint server contains the functionality of the VLANs and the media servers and that the media servers is connected to the private and public VLAN [see Figure 2, Figure 14, 0049, 0053]. Thus it would have been obvious to one of ordinary skill in the art to have incorporated the media server and VLAN elements into a single computer, such as his endpoint server. Not only does Headings suggests this implementation throughout his figures and specification, but such an implementation is merely a *design choice*, and does not provide any patentable distinction over prior art references as it has been held that forming in one piece an article which has formerly been formed in two pieces and put together only involves routine skill in the art. *Howard v. Detroit Stove Works*, 150 U.S. 164 (1893).

Art Unit: 2152

22> As to claim 2, Headings discloses a VPN connecting the public VLAN to the private VLAN [Figure 14 | 0049].

23> As to claim 3, Headings discloses a VPN allowing access to the private VLAN from a remote location [Figure 14 | 0049].

24> As to claim 5, Headings discloses a terrestrial link provides a back channel to the NOC [Figure 2 : note link between the media server farm to the content management system].

25> As to claim 7, Headings discloses content that is streamed [0002, 0032].

26> As to claim 9, Headings discloses one or more additional media servers capable of serving both live and non-live content [Figure 2 | 0002].

27> As to claim 11, Headings discloses shared storage connected to the private VLAN [Figure 14 : "content storage"].

28> Claims 1 are rejected under 35 U.S.C § 103(a) as being unpatentable over Lahr.

Art Unit: 2152

29> As to claim 1, Lahr discloses an edge node that receives content from a Network Operations Center (NOC) via a satellite content distribution network and distributes it to a last mile service provider, the edge node comprising:

one media server capable of serving both live and non-live content [Figure 8 | 0041];

a private Virtual Local Area Network (VLAN) that receives content from the satellite link and distributes it to the media server [0020 : "private network"];

a public VLAN that transmits the received content from the server to a last mile service provider [0020, 0022 : Lahr's use of the internet is comparable to a public VLAN]; and

where the media server is connected to both the public and private VLANs [Figure 8 | 0020, 0041, 0042].

Lahr does not explicitly disclose that the media server, private VLAN, and public VLAN exist in a single computer. However, Lahr seems to suggest such functionality. He describes a media delivery system contains the functionality of the VLANs and the media servers and that the media servers is connected to the private and public VLAN [see Figure 3 Figure 8, Figure 9]. Thus it would have been obvious to one of ordinary skill in the art to have incorporated the media server and VLAN elements into a single computer, such as his endpoint server. Not only does Lahr suggests this implementation throughout his figures and specification, but such an implementation is merely a *design choice*, and does not provide any patentable distinction over prior art references as it has been held that forming in one piece an article which has formerly been formed in two pieces and put together only involves routine skill in the art. *Howard v. Detroit Stove Works*, 150 U.S. 164 (1893).

30> As to claim 5, Lahr discloses a terrestrial link provides a back channel to the NOC [0044].

31> As to claim 7, Lahr discloses content that is streamed [Figure 8 | 0041].

32> As to claim 9, Lahr discloses one or more additional media servers capable of serving both live and non-live content [Figure 8 | 0032, 0041].

33> As to claim 11, Lahr discloses shared storage connected to the satellite interface and the processor [Figure 3 | Figure 8 | 0020, 0023].

34> Claims 2 and 3 are rejected under 35 U.S.C § 103(a) as being unpatentable over Lahr, in view of Taylor et al, US Patent Publication No. 2002|0065919 ["Taylor"].

35> As to claims 2 and 3, Lahr does expressly disclose a VPN.

36> Taylor discloses a VPN connecting the public VLAN to a private VLAN, the VPN allowing access to the private VLAN from a remote location [Figure 5 | 0047, 0056, 0138]. It would have been obvious to incorporate Taylor's teachings of VPNs into Lahr's content distribution system; to modify Lahr such that a VPN connects the public and private VLAN.

Art Unit: 2152

VPNs are well known and ubiquitous in the art for providing a level of security communicating in networks. Such a feature is thus desirable and useful in Lahr's system.

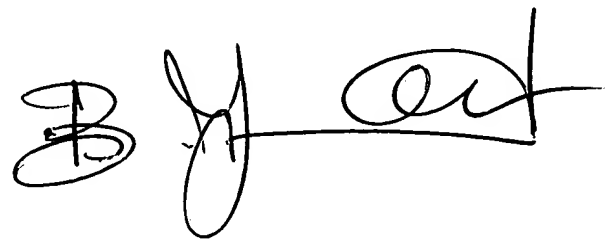
Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dohm Chankong whose telephone number is 571.272.3942. The examiner can normally be reached on Monday-Thursday [7:00 AM to 5:00 PM].

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bunjob Jaroenchonwanit can be reached on 571.272.3913. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

DC

A handwritten signature in black ink, appearing to read 'Bunjob Jaroenchonwanit', written in a cursive style.

**BUNJOB JAROENCHONWANIT
PRIMARY EXAMINER**